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EXAMINER

BACHNER, REBECCA M

ART UNIT PAPER NUMBER

3623

DATE MAILED: 05/09/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/407,664

Applicant(s)

KEELEY, THOMAS M. *W*

Examiner

Rebecca M Bachner

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE ____ MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on ____.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☐ Claim(s) ____ is/are pending in the application.
- 4a) Of the above claim(s) ____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) ____ is/are allowed.
- 6) ☒ Claim(s) 1-25 and 27-39 is/are rejected.
- 7) ☐ Claim(s) ____ is/are objected to.
- 8) ☐ Claim(s) ____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on ____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on ____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. ____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). ____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 2. 6) ☐ Other: .

DETAILED ACTION

1. The following is a Final Office Action in response to the communication received on February 22, 2002. Claims 1-25, and 27-39 are still pending.

Response to Amendments

2. Applicant's amendments to claims 1-25, and 27-39 are sufficient to overcome the §102 rejections set forth in the previous office action. Hence the previous §102 rejections for those claims are withdrawn. However, new §103 rejections have been established.

Applicant's amendment to claim 29 is sufficient to overcome the §112 rejection set for in the previous Office Action.

Applicant's canceling of claim 26 is sufficient to overcome the §112 rejection and the §101 rejection set forth in the previous Office Action.

Applicant's amendments to claims 27 and 28 are sufficient to overcome the §101 rejection set forth in the previous Office Action.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1-39 are rejected under 35 U.S.C. 103(a) as being unpatentable over Ogushi et al (EP 0822473 P.N.) in view of Chamberlin et al. (P.N. 4,703,325).

As per claim 1, Ogushi et al. disclose a factory automation system for providing status information on at least one factory comprising a factory automation component distributed by a first party, the component residing at a site location of a second party, and the component communicating status information to the first party wherein the first party compiles the status information from the component and utilizes the status information to the benefit of the second party (see column 1, lines 32-41, a remote maintenance system between two parties). Ogushi et al. do not explicitly teach the component communicating status information periodically. However, Chamberlin et al. disclose a component periodically communicating status information (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use a component that periodically communicates status information to the first party as it allows the party to be updated on any new status information. One would be motivated to periodically communicate information as a set time is a more reliable way to determine the occurrence of any status changes.

As per claim 2, Ogushi et al. disclose all the limitations of claim 1, and further that the first party is a vendor and/or service supplier of the component (see column 2, lines 16-32).

As per claim 3, Ogushi et al. disclose all the limitations of claim 1, and further state that the second party is a purchaser of the component and the site location is a factory of the purchaser where the component resides (see column 2, lines 16-32).

As per claim 4, Ogushi et al. disclose all the limitations of claim 1, and further state that the component communicated component health information to the first party from the location of the second party (see column 1, lines 42-56, the monitor allows the remote maintenance system to obtain status information and any occurrence of trouble, this information is the health of the component).

As per claim 5, Ogushi et al. disclose all the limitations of claim 4, and further state that the health information is selected from the group consisting of a component failure, a component degradation and a component out of calibration (see column 1, lines 6-14, maintenance is defined as any trouble with the industrial equipment that would need maintenance personnel to resolve the trouble, this inherently includes component failure, degradation and calibration).

As per claim 6, Ogushi et al. disclose all the limitations of claim 4, and further state that the site of the first party communicates patch information to the component in response to the health information from the component (see column 6, lines 9-19, the vendor responds to the components health information by communicating information back to the component).

As per claim 7, Ogushi et al. disclose all the limitations of claim 1, and further state that the component communicates version information to the server site of the first party from the location site of the second party (see column 5, lines 34-43, the factory host computer communicates version information, along with all other information relating to the component's health, to the vendor).

As per claim 8, Ogushi et al. disclose all the limitations of claim 7, and further state that the server site of the first party communicates version upgrade information to the component in response to version information from the component that does not correspond to the latest version (see column 4, lines 18-28, the first party must communicate version information from the component because this information must also be known by the first party, or vendor, in order for them to update the version; if the current version was unknown, the software could not be updated).

As per claim 9, Ogushi et al. disclose all the limitations of claim 1, and that the server site of the first party transmits a signal to the component in response to status information from the component that initiates an action by the component (see column 5, lines 17-39 and figure 3, the first party transmits the countermeasure in response to the status information by a signal over the internet to the host computer and the component at the factory; if a countermeasure is unavailable, the vendor notifies a person of the equipment status).

As per claim 10, Ogushi et al. disclose an internet business communication system including a website adapted to be employed by a vendor for receiving factory automation component status information over the internet from a plurality of factory components residing at one or more customer sites, each component having a different IP address, the website matching component information residing at the vendor's website with the IP address of the component and providing this information to the vendor (see column 3, lines 29-57, the maintenance system uses the internet and the world wide web as a means of communicating status information from the factory to the vendor, it also uses TCP/IP protocol and therefore each component inherently has an IP address). Ogushi et al. do not explicitly teach the component communicating status information periodically. However, Chamberlin et al. disclose a vendor for periodically receiving factory automation component status information (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use a component that periodically communicates status information to the vendor as it allows the vendor to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine any status changes.

As per claim 11, Ogushi et al. disclose all the limitations of claim 10, wherein the status information includes components health information. Such that the vendor can communicate with a customer that one of the plurality of components in the one or more

customer sites require attentions by the customer (see column 1, lines 57–58 though column 2, lines 1-15, the status information communicates any equipment trouble to all of the components given to the vendor by the customer, the equipment trouble is the health of the component).

As per claim 12, Ogushi et al. disclose all the limitations of claim 10, wherein the status information includes the components version information, such that the facilitator can communicate to a customer that one of the plurality of components in the one or more customer sites require a version update (see column 4, lines 22-28, version update must be included in the status information in order for the vendor to eliminate the trouble on the equipment by doing a software upgrade).

As per claim 13, Ogushi et al. disclose all the limitations of claim 10, and that the status information includes customer identification, customer site information, and the component location within the customer's site (see column 3, lines 29-33 and column 4, lines 40-47, all the status information is given to the vendor by a host computer from a factory, all of this information must be included in order for the vendor to look up the problem in the database and fix the equipment).

As per claim 14, Ogushi et al. disclose all the limitations of claim 10, wherein the component information includes customer identification, customer site information, and the component location within the customer's site (see column 5, lines 34-43, the host

computer includes customer information when sending the component information to the vendor, all of this information must be included in other associated information in order for the vendor to know what component to fix).

As per claim 15, Ogushi et al. disclose all the limitations of claim 10, wherein the status information includes the component health information and the website can communicate patch information to at least one of the plurality of components in response to component health information (see column 5, lines 34-43, and column 6, lines 9-19, the host computer includes component health information when sending the status information to the vendor and the vendor uses the internet to communicate patch information back to the host computer).

As per claim 16, Ogushi et al. disclose all the limitations of claim 10, wherein the status information includes all the component version information, such that the website can communicate patch information to at least one of the plurality of components in response to component version information (see column 4, lines 18-28, the status information sent to the host computer through the internet includes information about the operating state, the host computer can then communicate patch information to the equipment, the information about the operating state must also include version information as the host would not be able to update the version if the current version was unknown).

As per claim 17, Ogushi et al. disclose all limitations of claim 10, where in the website transmits a signal to at least one of the plurality of components in response to status information from the component that initiates an action to the component (see column 5, lines 17-39 and figure 3, the vendor host computer transmits the countermeasure in response to the status information by a signal over the internet to the host computer and the component at the factory; if a countermeasure is unavailable, the vendor notifies a person of the equipment status).

As per claim 18, Ogushi et al. discloses a method of providing a status information to a vendor on at least one factory automation component sold by the vendor to at least one customer, comprising the steps of: locating at least one component at a site of at least one customer (see column 2, lines 16-32, a factory automation component sold by a vendor and located at the customer's component site), connecting at least one component to a network connected to a server of the vendor (see column 3, lines 29-33 and 45-48, the network and server are connected through a LAN), communicating periodically component status information from the at least one component to the server of the vendor (see column 4, lines 40-47, the status information is given to the vendor), searching a database located on the server of the vendor for customer identification and component location information corresponding to the status information of the at least one component (see column 4, lines 40-44, the customer identification is given to the vendor and column 5, lines 34-48, the vendor computer receives the status information which is searched on the troubleshooting

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database), and outputting the customer identification information and component status and location information to the vendor (see column 5, lines 34-43, the vendor receives the customer identification information and status).

Ogushi et al. do not explicitly teach communicating periodically component status information. However, Chamberlin et al. disclose communicating periodically component status information from the at least one component to the server of the vendor (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use a component that periodically communicates status information to the vendor as it allows the vendor to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine any status changes.

As per claim 19, Ogushi et al. disclose all the limitations in claim 18, and that the status information includes an IP address associated with the component and the step of searching includes matching the customer identification information and component location information corresponding to the IP address included in the status information (see column 3, lines 45-48 and column 4, lines 40-47, the host computer and the vendor communicate through the internet using IP addresses, and the vendor determines the component using the customer information and component location included in the status information).

As per claim 20, Ogushi et al. disclose all the limitations of claim 18, and further include that the step of communicating a signal to at least one component from the server in response to the component status information that initiates an action to at least one component (see column 5, lines 17-33, the host computer receives the status information and restores the equipment or outputs a message to the operator).

As per claim 21, Ogushi et al. disclose all the limitations of claim 18, and that the server determines if the at least one component has enabled the at least one component to receive communication from the server (see column 4, lines 40-57, the host computer on the vendor side and the host computer on the factory side wait for communication from one another).

As per claim 22, Ogushi et al. disclose all the limitations of claim 18, wherein the status information includes component health information of the at least one component (see column 4, lines 31-39, the status information includes an error code representing the contents of the trouble which contain the health information of the equipment).

As per claim 23, Ogushi et al. disclose all the limitations of claim 22, wherein the server communicates patch information to the component in response to health information from the component (see column 5, lines 17-33, the host computer on the vendor side communicates with the host computer on the factory side to try and restore the equipment to its normal state).

As per claim 24, Ogushi et al. disclose all the limitations of claim 18, and that the status information includes version information of the at least one component (see column 4, lines 18-28, the status information sent to the host computer includes information about the operating state, this information must also include version information as the host would not be able to update the version if the current version was unknown).

As per claim 25, Ogushi et al. disclose all the limitations of claim 24, wherein the server communicates version upgrade information to at least one component in response to version information from the at least one component that does not correspond to the latest version (see column 4, lines 22-28, the host computer maintains the equipment through software upgrades on the basis of response information transmitted from the vendor in response to status information).

As per claim 27, Ogushi et al. disclose a computer memory, comprising a periodic status message provided by a factory automation component, the status message including health information relating to the factory automation component, the factory automation component having an IP address. Claim 27 is rejected because it is only claiming a computer memory. The rest of the description is merely nonfunctional descriptive data and does not change the computer memory. Therefore, it is given no

patentable weight and any computer memory with anticipate this claim (see column 1, lines 23-28, all computers contain a memory).

As per claim 28, Ogushi et al. disclose all the limitations of claim 27, further comprising a vendor is a website which matches the IP address of the component with customer identification information and component location information. Claim 28 is rejected because it is only claiming the computer memory of claim 27. The rest of the description of claim 28 is merely nonfunctional descriptive data and does not change the computer memory. Therefore, it is given no patentable weight and any computer memory with anticipate this claim (see column 1, lines 23-28, all computers contain a memory).

As per claim 29, Ogushi et al. disclose an internet business communication system including:

means for receiving factory automated component status information over the Internet (see column 1, lines 32-41, a remote maintenance system between two parties); and

means for matching a factory automated component location and customer identification with status information provided by the factory automated component over the Internet, the status information including the information relating to the health of the component wherein the component is located at a site location of a customer and communicates status information to a site vendor (see column 3, lines 29-37, the host

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machine at the factory transmits status information, which includes the health of the component, to the vendor through the internet).

Ogushi et al. do not explicitly teach means for periodically receiving factory automated component status information over the Internet. However, Chamberlin et al. disclose communicating periodically component status (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to periodically communicates status information as it allows one to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine any status changes.

As per claim 30, Ogushi et al. disclose a factory automated component comprising a processor, a memory coupled to a processor and a network interface coupled to the processor for transmitting and receiving data with at least one remote computer system, wherein the factory component communicates status information to the at least one remote computer system (see column 3, lines 29-48, the factory automated component communicates by transmitting signals though the internet with a factory host computer, this host computer then sends status information to the remote vendor host computer which in turn sends responses, or countermeasures, to the host computer at the factory; all computers inherently contain a processor and a memory).

Ogushi et al. do not explicitly teach that the factory component communicates status information periodically to the at least one remote computer system. However, Chamberlin et al. disclose communicating status information periodically to at least one

remote computer (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use periodically communicate status information to a remote computer as it allows the vendor to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine if any status changes have occurred.

As per claim 31, Ogushi et al. disclose all the limitations of claim 30, and that the status information includes information related to the health of the component (see column 4, lines 31-39, the status information includes an error code representing the of contents of the trouble which contain the health information).

As per claim 32, Ogushi et al. disclose all the limitations of claim 30, wherein the status information includes version information of the component (see column 4, lines 18-28, the status information sent to the host computer includes information about the operating state, this information must also include version information as the host would not be able to update the version if the current version was unknown).

As per claim 33, Ogushi et al. disclose all the limitations of claim 30, wherein the component includes an enabled mode for receiving communication from at least one computer and a disabled mode blocking communication from at least one computer (see column 4, lines 40-57, the vendor and the factory computers have enabled

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communication only when both computers are turned on; therefore if one computer is turned off, communication is disabled and blocked).

As per claim 34, Ogushi et al. disclose a system for monitoring factory automated components electronically, comprising: a central server adapted to periodically receive status information from one or more factory automated components located at one or more customer sites, the central server being located at a site of a vendor, wherein the server is configured to match component status information to customer identification information and component location information of one or more factory automated components and output this information to the vendor (see column 3, lines 29-44, an automated factory which uses a host computers at the factory and a host computer at the vendor site to communicate with each other about the status of the industrial equipment at a particular factory site).

Ogushi et al. do not explicitly teach a central server adapted to periodically receive status information from one or more factory automated components located at one or more customer sites. However, Chamberlin et al. disclose communicating periodically status information from a component (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use a component that periodically communicates status information as it allows one to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine if any status changes occurred.

As per claim 35, Ogushi et al. disclose all the limitations of claim 34 and status information including components version information, such that the server can communicate to a customer that one or more components require a version update (see column 4, lines 23-28, version update must be included in the status information in order for the vendor to eliminate the trouble on the equipment by doing a software upgrade).

As per claim 36, Ogushi et al. disclose all the limitations of claim 34, and the server transmits a signal to the one or more components via the at least one remote computer in response to status information from the component that initiates an action to the component (see column 5, lines 17-39 and figure 3, the vendor host computer transmits the countermeasure in response to the status information by a signal over the internet to a host computer at the factory; if a countermeasure is unavailable, the vendor notifies a person of the equipment status).

As per claim 37, Ogushi et al. disclose all the limitations of claim 34, wherein the server hosts a website of the vendor and the server matches the component information with the component status information with the customer identification information and component location by using an IP address associated with the component (see column 3, lines 45-48 and column 4, lines 40-47, the host computer and the vendor communicate through the internet using IP addresses, and the vendor determines the

component using the customer information and component location included in the status information).

As per claim 38, Ogushi et al. disclose all the limitations of claim 35, wherein the status information includes the components of health information, such that the vendor can communicate to a customer that the one or more components in the one or more customer sites require attention by the customer (see column 3, lines 29-44, and column 5, lines 34-43, the status information includes the health of the equipment and the factory and vendor host computers communicate with one another to alert customers of components that require attention).

As per claim 39, Ogushi et al. disclose a system for providing status information to a vendor on at least one factory automation component sold by the vendor to at least one customer comprising: means locating at least one component at a site of at least one customer (see column 2, lines 16-32, a factory automation component sold by a vendor and located at the customer's component site), means for connecting the at least one component to a network connected to a server of the vendor (see column 3, lines 29-33 and 45-48, the network and server are connected through a LAN), means for communicating component status information from the at least one component to the server of the vendor (see column 4, lines 40-47, the status information is given to the vendor), means for searching a database located on the server of the vendor for

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to the status information of the at least one component (see column 4, lines 40-44, state that the customer identification is given to the vendor and column 5, lines 34-48, the vendor computer receives the status information and the status information is searched for on the troubleshooting database), and means for outputting the customer identification and component status and location information to the vendor (see column 5, lines 34-43, the vendor receives the customer identification information and status).

Ogushi et al. do not explicitly teach means for communicating periodically component status information from the at least one component to the server of the vendor. However, Chamberlin et al. disclose communicating periodically component status information from the at least one component to the server of the vendor (see column 2, lines 34-43). It would be obvious to one of ordinary skill in the art to use a component that periodically communicates status information to the vendor as it allows the vendor to be updated on any new status information. One would be motivated to periodically communicate information, as a set time is a more reliable way to determine if any status changes have occurred.

Response to arguments

5. Applicant's arguments with regard to the §102 rejections based on Ogushi et al. have been fully considered. In the remarks, the Applicant argues that Ogushi et al. do not disclose a periodic status information or messages.

In response to Applicant's argument that the a periodic status information or messages are not disclosed, the Examiner acknowledges that Ogushi et al. do not necessarily state that the status updates are given periodically. However, Chamberlin discloses periodic status updates and it would be obvious to one of ordinary skill in the art for Ogushi to use periodic status updates. In Ogushi et al., status messages are sent to the vendor and the vendor is notified if a problem occurs. In Chamberlin et al. periodic messaging and status updates are used for the same purpose of notification. Both of the inventions are used to determine status of the components to the vendor. Therefore, it would have been obvious for Ogushi to use periodic status messages for the purpose of determining the occurrence of a problem.

Therefore, based on the reasons stated above, the Applicant's arguments are found persuasive and the §102 rejection is withdrawn. However, a new §103 reject for claims 1-25, and 27-39 is established.

6. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Kardos et al. (P.N. 6,345,281) discuss a method and system for communicating orders from disparate hosts.

Conclusion

7. No claims allowed.
8. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office Action. Accordingly, THIS ACTION IS MADE FINAL. See MPEP 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant of to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

9. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Rebecca Bachner whose telephone number is 703-305-1872. The examiner can normally be reached Monday - Friday from 8:00am to 4:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Tariq Hafiz, can be reached at 703-305-9643.

The fax numbers for the organization where this application or proceeding is assigned are as follows:

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703-746-7238 [After Final Communication]

703-746-7239 [Official Communications]

703-746-7240 [For status inquiries, draft communication]

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-305-3900.

RMB

RMB

April 26, 2002


TARIQ R. HAFIZ
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2100